



A Study of the Intelligence of the Students from Gujarati Medium and the Students from English Medium Having Gujarati as Their First Language

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Abstract

This study reports the effect of learning through second language (English) as medium of instruction on intelligence of High school students of Gandhinagar, Gujarat. 30 students of English Medium School which have mother tongue as Gujarati and 30 students of Gujarati Medium School were randomly selected. Monolingual children spoke Gujarati at home and studied in school through Gujarati and bilingual children spoke with Gujarati or English at home and studied through English medium at school from first grade. Both the linguistic groups were tested in Gujarati and English version of Dr. K.G. Desai verbal-Non verbal Intelligence test for children. Results indicated that there is no accomplished difference between the IQ of the students studying in Gujarati medium and the students studying in English medium having Gujarati as their first language.

Keywords: *Intelligence, Gujarati Medium, English Medium, First Language, Second language*

1. Introduction

The vast body of psycholinguistic research that has emerged in recent years has indicated that language development and cognitive development are intimately related. Empirical research on the relationships between language and cognitive development, especially in bilingual environments, is of great relevance in the context of educational programs and in the context of theoretical perspectives on cognitive development. In some sense, the entire educational system in India is a bilingual system. No Indian student can ever hope to complete his school and collegiate education without studying at least two languages. Also in most cases, a language that may or may not be the mother tongue of the student may be used as the medium of instruction.

The role of bilingual education involving the mother tongue-medium of instruction has been subjected to thorough investigation by several studies. For example, in the Indian context, Anand (1971) compared the Kannada and English medium students and found the former significantly superior in verbal intelligence and achievement and the latter in nonverbal intelligence. However, a number of studies have reported either beneficial effect or no detrimental effect on the cognition of the child if he is educated through a medium other than his own mother tongue. A pilot study conducted by Srivastava and Khatoon (1980) in the schools of Mysore city with standard eight students showed that the English medium students scored significantly better than those in Kannada medium on the measures of nonverbal intelligence and the three dimensions of verbal creativity, namely, fluency, flexibility, and originality. However, when the school related measures were controlled, there was hardly any difference between the two streams.

The system of getting education in mother tongue is extremely wide and many educationalists have recommended giving education in the mother tongue itself. Still it has been observed in recent times that the attraction towards English medium in society is increasing day by day. Parents think that their child would be developed and intelligent by studying only in English medium schools. As a result, those parents, who themselves have not studied in English medium schools, admit their child in English medium schools. Same way, English medium institutions have been spreading like a dodder

nowadays. Many researches have been done in order to see whether the intelligence of the child is developing by studying in a different medium from his mother tongue or not. In such circumstances, the researcher has tried a comparative study to know the intelligence of Gujarati medium students and that of English medium students, so that everybody related to education can find a way from it.

2. Objectives

1. To study the intelligence of Gujarati medium students.
2. To study the intelligence of English medium students having Gujarati as their first language.
3. To compare the intelligence of the students of both the mediums.

3. Hypothesis

There is no significance difference between the intelligence of the students studying in Gujarati medium and the students studying in English medium having Gujarati as their first language.

4. Sample

The students were from Shree Swaminarayana Gurukul of Gandhinagar city, district of Gujarat. This district offered several intriguing combinations of the medium of instruction. In these schools instruction was being given through two languages, namely, Gujarati and English. Note that this district has been returning a higher literacy rate than other districts in Gujarat. School administration in these schools in terms of the syllabus, teaching conditions, and examination patterns was uniform. As a result, the influence of school environment as an intervening variable was controlled. As there was provision for co-education in all two schools we covered, almost equal representation from both boys and girls was available.

30 students from std. 8 of an English medium school and 30 students from std. 8 of a Gujarati medium school from Shree Swaminarayana Gurukul of Gandhinagar city, district of Gujarat were randomly selected.

5. Data Analysis and Interpretation

A verbal – non-verbal intelligence test prepared by Dr. K. G. Desai was implemented to know the intelligence of the students from Gujarati and English medium. Based on the obtained results, the intelligence of the students from both the mediums were found from the intelligence numbers of the verbal – non-verbal intelligence test prepared by Dr. K. G. Desai. The median of the Gujarati medium students' IQ was found 110.43 and the median of the English medium students' IQ was found 105.47. Moreover, t-value was obtained using t-test in order to find the significant difference between the students of both the mediums.

t-value is 1.57, which is less than 2.66 in the obtained table on the significant level of 0.01 and so null hypothesis is accepted. Therefore, there is no significant difference between the intelligence of the students from both the mediums.

6. Finding

There is no significant difference between the intelligence of the students studying in Gujarati medium and the students studying in English medium having Gujarati as their first language.

English medium group scored lower than others in the verbal intelligence tests. This lower performance may be due to the effect of bilingual learning, using English and not the mother tongue as the medium of instruction. However, one could also argue that these students had lesser verbal intelligence even in the earlier classes and their present performance was merely a continuation of their original endowment.

7. Conclusion

Thus, on the basis of the obtained results of the intelligence test of Gujarati and English medium students, it can be said that the intelligence of the students has no connection with the medium. The results of the empirical investigations as to the impact of the mother tongue medium of instruction vis-à-vis the use of English or a non-mother tongue language as the medium of instruction are still mixed, and somewhat confusing. But the balance is certainly in favor of the mother tongue as the medium of instruction as a pragmatic approach. It certainly is the best for those who belong to the lower socio-economic levels because enriched contexts in the use of the English language are not easily available to these groups of people. But parents see only the advantage in career options that may be available to their children if they get educated through the medium of English right from the beginning level of school education. The fight against the mother tongue medium of instruction is bound to be more intense over the years. It is clear that the issues relating to the medium of instruction cannot be fully resolved without taking the overall socio-political factors into consideration. We can get better guidance regarding this, if these students' result in public examination is compared.

8. References

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